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EXAMINER

SHAPIRO, LEONID

ART UNIT	PAPER NUMBER
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2673

DATE MAILED: 01/21/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

# Office Action Summary

Application No.

09/690,455

Inventor(s)

YOSHIHARA ET AL.

Examiner

Leonid Shapiro

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

## Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

## Status

- 1) ☒ Responsive to communication(s) filed on 28 December 2002.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

## Disposition of Claims

- 4) ☒ Claim(s) 1-30 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-30 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

## Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 18 October 2000 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on \_\_\_\_\_ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

## Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

## Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) \_\_\_\_\_.
- 4) ☐ Interview Summary (PTO-413) Paper No(s). \_\_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_\_.

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Applicant's request for reconsideration of the finality of the rejection of the last Office action is persuasive and, therefore, the finality of that action is withdrawn.

***Priority***

1. Receipt is acknowledged of papers submitted under 35 U.S.C. 119(a)-(d), which papers have been placed of record in the file.

***Drawings***

2. The drawings are objected to under 37 CFR 1.83(a). The drawings must show every feature of the invention specified in the claims. Therefore, the “...**first panel adapted to be mounted onto a surface in said vehicle**”, as claimed in independent claims 1 and 23 must be shown or the feature(s) canceled from the claim(s). No new matter should be entered.

A proposed drawing correction or corrected drawings are required in reply to the Office action to avoid abandonment of the application. The objection to the drawings will not be held in abeyance.

***Claim Rejections - 35 USC § 112***

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

3. Claims 8-10 recite the limitations: "changing function indication according to predetermined condition" in claim 8, "displaying the current audio source" in claim 9, and

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“switching source upon detection” in claim 10. There is insufficient antecedent basis for those limitations in the claims.

***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claims 1, 23-25 rejected under 35 U.S.C. 103(a) as being unpatentable over Hartman (US Patent No. 6,067,078) in view of Harada et al. (US Patent No. 6,072,476).

As to claim 1, Hartman teaches about a vehicle-mounted apparatus comprising: a first panel including a first display, said first panel adapted to be mounted onto a surface in said vehicle (See Fig 2, items 30, 26, 44, 50, in description See Col. 2, Lines 54-64); and a second panel including a second display (See Fig 2, items 34, 28, in description See Col. 2, Lines 54-68). Hartman does not show the second panel is adapted to be opened and closed with respect to the first display about a side as an axis.

Harada et al teaches the second panel is adapted to be opened and closed with respect to the first display about a side as an axis (See Fig 2a-2c, items 51, 53, 54-2, 54-1, 56, in description See Col. 8, Lines 9-26). It would have been obvious to one of ordinary skill in the art in the time of invention to use Harada et al. approach in the Hartman apparatus in order to provide image display device with dual-screen independent mode (See Col. 1, Lines 61-64 in Harada et al. reference).

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As to claim 23, Hartman teaches a display device, comprising: a first panel including a first display, said first panel adapted to be mounted on a surface (See Fig 2, items 30, 26, 44, 50, in description See Col. 2, Lines 54-64); and a second panel including a second display (See Fig 2, items 34, 28, in description See Col. 2, Lines 54-68). Hartman does not show the second panel is adapted to be opened and closed with respect to the first display about a side as an axis.

Harada et al teaches the second panel is adapted to be opened and closed with respect to the first display about an axis located at an edge of said first display (See Fig 2a-2c, items 51, 53, 54-2, 54-1, 56, in description See Col. 8, Lines 9-26). It would have been obvious to one of ordinary skill in the art in the time of invention to use Harada et al. approach in the Hartman apparatus in order to provide image display device with dual-screen independent mode (See Col. 1, Lines 61-64 in Harada et al. reference).

As to claims 24-25, Hartman and Harada et al. do not teach a portion of first display is visible, when second panel in a closed position and visible portion provide a display. It would have been obvious to one of ordinary skill in the art in the time of invention to modify Hartman and Harada et al. system to open the portion of first panel when second panel is closed in order to provide image display device with dual-screen independent mode (See Col. 1, Lines 61-64 in Harada et al. reference).

5. Claim 2 rejected under 35 U.S.C. 103(a) as being unpatentable over Hartman and Harada et al. as aforementioned in claim 1 in view of Jin. (US Patent No. 5, 659, 361).

Hartman and Harada et al. does not teach about second panel be turned upside down. Jin shows tiltable, rotatable panel as LCD viewfinder could be rotated 360° (See Fig. 3A, items 1, 2,

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in description See Col. 3, Lines 49-55 and Col. 4, Lines 21-25). It would have been obvious to one of ordinary skill in the art in the time of invention to use Jin rotatable panel in Harada et al. system with two displays in a vehicle to improve operability of the vehicle-mounted apparatus.

6. Claims 3, 8 and 11, 26 rejected under 35 U.S.C. 103(a) as being unpatentable over Hartman, Harada et al. and Jin as aforementioned in claims 1-2 and 23 in view of Pabon et al. (US Patent No. 6, 256, 020 B1).

As to claims 3,11, 26, Hartman, Harada et al. and Jin does not teach about an operating and means to change the function on operating switch according to the predetermined conditions. Pabon et al. shows how to indicate a current function assigned to each operating switch key (switch). (See Fig.2, item 24, in description See Col. 3, Lines 10-15 and Col. 4, Lines 58-68).

It would have been obvious to one of ordinary skill in the art in the time of invention to use Pabon et al. method in Harada et al. and Jin system to achieve more flexibility and reduce cost by using the computer resources.

As to claim 8 as best understood by examiner, Hartman teaches a method of controlling a vehicle-mounted apparatus comprising: a first panel having a first display (See Fig, items 30, 26, 44, 50, in description See Col. 2, Lines 54-64); and a second panel having a second display (See Fig 2, items 34,28, in description See Col. 2, Lines 54-68). Hartman does not show the second panel is adapted to be opened and closed with respect to the first display about a side edge.

Harada et al teaches the second panel is adapted to be opened and closed with respect to the first display about a side as an axis (See Fig 2a-2c, items 51, 53, 54-2, 54-1, 56, in

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description See Col. 8, Lines 9-26). It would have been obvious to one of ordinary skill in the art in the time of invention to use Harada et al. approach in the Hartman apparatus in order to provide image display device with dual-screen independent mode (See Col. 1, Lines 61-64 in Harada et al. reference).

Hartman, Harada et al. and Jin does not teach about an operating and means to change the function on operating switch according to the predetermined conditions with rotation upside down. Pabon et al. shows how to indicate a current function assigned to each operating switch key (switch). (See Fig.2, item 24, in description See Col. 3, Lines 10-15 and Col. 4, Lines 58-68). It would have been obvious to one of ordinary skill in the art in the time of invention to use Pabon et al. method in Harada et al. and Jin system to achieve more flexibility and reduce cost by using the computer resources.

7. Claims 4, 5 and 12-14, 27 rejected under 35 U.S.C. 103(a) as being unpatentable over Hartman, Harada et al., and Jin, and Pabon et al. as aforementioned in claims 2-3, 23 in view of Nakadozono (US Patent No. 5, 121, 112).

As to claims 4, 12, Harada et al., and Jin, and Pabon et al. teach how to rotate second panel and how change the function indication on operating switch. Hartman, Harada et al., and Jin, and Pabon et al. do not show means for rotating switch and function indication. Nakadozono shows plurality of sensors, display and means of control (See Fig.1, items 101, 103, in description See Col. 2, Lines 50-60). It would have been obvious to one of ordinary skill in the art in the time of invention to use Nakadozono method of detection when the second panel is

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rotated upside down in Hartman, Haraga et al., and Jin, and Paton et al system to change function indication to achieve more flexibility and reduce cost by using the computer resources.

As to claims 5, 13-14, 27, Hartman, Harada et al., and Jin, and Pabon et al. show an axis of rotating relative to the upside down rotation of a second display. Harada et al., and Jin, and Pabon et al. do not show a first and second gears, button on the opposite surface of the second panel and slide plate with a rack for rotation... As shown above in rejection of claim 4 there is alternative way of implementation of changing function indication without mechanically rotating switch achieve more flexibility and reduce cost by using the computer resources.

8. Claims 6, 9 and 15-18, 28-30 rejected under 35 U.S.C. 103(a) as being unpatentable over Hartman, Harada et al. and Jin, and Pabon et al, and Nakadozono as aforementioned in claims 1-6, 23 in view of Ishii et al. (US Patent No. 5, 710, 600).

As to claims 6, 15 –18, 28-30, Hartman, Harada et al. shows the first and second displays. Hartman, Harada et al., Jin, and Pabon et al, and Nakadozono does not show means for displaying the current audio source on at least one of the displays. Ishii et al. shows images of the current audio source. (See Fig. 1, 3, item 2, in description See Col. 5, Lines 8-20). It would have been obvious to one of ordinary skill in the art in the time of invention to use Ishii et al. method of displaying in Hartman, Haraga et al , Jin, and Pabon et al, and Nakadozono system to identify the current audio source.

As to claims 9 as best understood by examiner, Hartman teaches a method of controlling a vehicle-mounted apparatus comprising: a first panel having a first display (See Fig, items 30, 26, 44, 50, in description See Col. 2, Lines 54-64); and a second panel having a second display



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(See Fig 2, items 34,28, in description See Col. 2, Lines 54-68). Hartman does not show the second panel is adapted to be opened and closed with respect to the first display about a side edge.

Harada et al teaches the second panel is adapted to be opened and closed with respect to the first display about a side as an axis (See Fig 2a-2c, items 51, 53, 54-2, 54-1, 56, in description See Col. 8, Lines 9-26). It would have been obvious to one of ordinary skill in the art in the time of invention to use Harada et al. approach in the Hartman apparatus in order to provide image display device with dual-screen independent mode (See Col. 1, Lines 61-64 in Harada et al. reference).

Hartman, Harada et al., Jin, and Pabon et al, and Nakadozono does not show means for displaying the current audio source on at least one of the displays with rotation the second panel upside down. Ishii et al. shows images of the current audio source. (See Fig. 1, 3, item 2, in description See Col. 5, Lines 8-20). It would have been obvious to one of ordinary skill in the art in the time of invention to use Ishii et al. method of displaying in Hartman, Haraga et al., Jin, and Pabon et al, and Nakadozono system to identify the current audio source.

9. Claims 7, 10 and 19-22 rejected under 35 U.S.C. 103(a) as being unpatentable over Hartman, Harada et al., and Jin, and Pabon et al. as aforementioned in claims 2 and 3 in view of Kamamoto et al. (US Patent No. 5, 982, 429).

As to claims 7, 19-22, Hartman, Harada et al., and Jin, and Pabon et al. teach how to rotate second panel and how change the function indication on operating switch.

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Hartman, Harada et al., and Jin, and Pabon et al. do not show means for switching the source upon detection. Kamamoto et al. shows how to enable a speaker upon movement of the viewfinder from a closed position. (See Fig. 2, items 1, 7, in description See Col. 2, Lines 30-40). It would have been obvious to one of ordinary skill in the art in the time of invention to use Kamamoto et al method of displaying in Hartman, Harada et al., and Jin, and Pabon et al. system to switch the source upon detecting for the user convenience.

As to claim 10 as best understood by examiner, Hartman teaches a method of controlling a vehicle-mounted apparatus comprising: a first panel having a first display (See Fig, items 30, 26, 44, 50, in description See Col. 2, Lines 54-64); and a second panel having a second display (See Fig 2, items 34,28, in description See Col. 2, Lines 54-68). Hartman does not show the second panel is adapted to be opened and closed with respect to the first display about a side edge.

Harada et al teaches the second panel is adapted to be opened and closed with respect to the first display about a side as an axis (See Fig 2a-2c, items 51, 53, 54-2, 54-1, 56, in description See Col. 8, Lines 9-26). It would have been obvious to one of ordinary skill in the art in the time of invention to use Harada et al. approach in the Hartman apparatus in order to provide image display device with dual-screen independent mode (See Col. 1, Lines 61-64 in Harada et al. reference).

Hartman, Harada et al., and Jin, and Pabon et al. do not show means for switching the source upon detection with second panel rotated upside down or at a predetermined angle in terms of at least one of the open/close actions and rotation.

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Kamamoto et al. shows how to enable a speaker upon movement of the viewfinder from a closed position. (See Fig. 2, items 1, 7, in description See Col. 2, Lines 30-40). It would have been obvious to one of ordinary skill in the art in the time of invention to use Kamamoto et al method of displaying in Hartman, Harada et al., and Jin, and Pabon et al. system to switch the source upon detecting for the user convenience.


### *Conclusion*

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Leonid Shapiro whose telephone number is 703-305-5661. The examiner can normally be reached on 8 a.m. to 5 p.m..

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Bipin Shalwala can be reached on 703-305-4938. The fax phone numbers for the organization where this application or proceeding is assigned are 703-872-9314 for regular communications and 703-872-9314 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 703-305-4750.

ls  
January 17, 2003

  
BIPIN SHALWALA  
SUPERVISORY PERSONNEL  
TECHNOLOGY CENTER 2010